

Attorney Docket No.: PTQ-0027
Inventors: Van Eyk et al.
Serial No.: 09/115,589
Filing Date: July 15, 1998
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Amendments to the Specification:

Please replace the paragraph beginning at page 12, line 14, with the following:

The terms "severe ischemia" and "severe ischemia/reperfusion injury" refer to situations where irreversible damage to skeletal muscle or the myocardium has occurred, i.e., situations where the muscle cannot regain its full ability to contract. Usually, in such situations, there is a loss of cellular membrane integrity and cellular proteins are released and necrosis occurs. Severe myocardial ischemia and/or ischemia/reperfusion injury are often marked by the presence of one or more of a myosin light chain 1 modification product(s) (e.g., amino acid residues 20 to 199 (~~SEQ ID NO:28~~)), an additional TnI modification product(s) (e.g., amino acid residues 63 to 193; rat sequence, SEQ ID NO:22; corresponding human sequence, SEQ ID NO:23, amino acid residues 73 to 193; rat sequence, SEQ ID NO:24; corresponding human sequence, SEQ ID NO:25), TnT modification product(s), and α -actinin modification product(s).

Please replace the paragraph at page 24, beginning at line 12 with the following:

Different myofilament proteins are more or less susceptible to modification depending on the extent of

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ischemic or ischemic/reperfusion injury that has occurred. Thus, the appearance of a certain modification to a specific proteins can be used as a marker/index for extent of muscle damage. For example, MLC1 degradation (residues 20-~~192~~ 199~~+~~
~~SEQ ID NO:28~~) occurs only with very severe ischemia in the myocardium. Therefore, if one detects this smaller fragment of MLC1 in a biological sample, it is an indication that the myocardium is severely and possibly irreversibly damaged.

Please replace the paragraph at page 25, beginning at line 4 with the following:

6. MLC1 degradation (residues 20-~~192~~(~~SEQ ID NO:28~~)
199).